



Evaluation #

201001-I
(Replaces 200400-I)
File No.: 20109001

Safety & Buildings Division
201 West Washington Avenue
P.O. Box 2658
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Wisconsin Building Product Evaluation

Material

Modular Sandwich Panels for Walk-In-Coolers and Freezers

Manufacturer

Carroll Coolers
19705 Hwy. 30 W.
Carroll, IA 51401

SCOPE OF EVALUATION

This report evaluates the modular sandwich panels manufactured by Carroll Coolers and used in the construction of walk-in coolers and freezers. The panels were reviewed for compliance with the surface burning characteristics and the large scale testing requirements of UL 1715, Fire Test of Interior Finish Material, as spelled out in **IBC section 2603.9**.

The **2006 edition of the International Building Code (IBC)** as adopted and modified within the current **Wisconsin Commercial Building Code (WCBC)** as well as the **2009 edition of the International Building Code (IBC)** were used as the basis for determining compliance.

DESCRIPTION AND USE

Carroll Coolers walk-in coolers and freezers consist of 5-1/2 and 3-1/2 inch thick wood-framed wall and ceiling panels with foamed-in-place urethane insulation cores and Stucco Galvanized steel cladding as the base surface finish material. A variety of optional finishes and finish materials are available. The panels have tongue and groove construction and are joined together using a cam lock fastener that is operated with a hex wrench.

TESTS AND RESULTS

Testing on 5-1/2 inch thick wood-framed panels was conducted in accordance with the Underwriter’s Laboratories Standard “Fire Test of Interior Finish Material, UL 1715”. The 5-1/2 inch thick wood edged panels had foam plastic core material, at a nominal density of 2.0 lb./ft³ surfaced with 26 gauge (0.0179-inch) steel facing materials. Steel or plastic plug buttons are provided by the manufacturer to be inserted into the cam-lock access holes after assembly.

SURFACE BURNING CHARACTERISTICS

Characteristic	Core Material	3-1/2 to 5-1/2 inch Thick Painted or Unpainted Steel Finished Panel	3-1/2 to 5-1/2 inch Thick Painted or Unpainted Aluminum Finished Panel
Flame Spread	25	20	20
Smoke Developed	450	350	250

As specified in **IBC section 2603.9**, the panels meet the flame spread requirements of **IBC Chapter 8**, but are not subject to the smoke developed limitations.

Test data is on file with the department.

CONDITIONS OF USE WISCONSIN COMMERCIAL BUILDING CODE

Based on the diversified large scale testing and **IBC section 2603.9**, the walk-in cooler and freezer panels listed within this evaluation are not subject to the requirements of **IBC sections 2603.4 through 2603.7**. Among other things, the panels may be used without a thermal barrier and, unless required by a different code requirement, the panels need not be protected by an automatic sprinkler system.

The cooler and freezer panels are limited to a maximum height of 8 feet and maximum thickness of 5-1/2 inches.

The Wisconsin Building Product Evaluation number must be provided when plans that include this product are submitted for review.

DISCLAIMER

The department is not endorsing or advertising this product. This approval addresses only the specified applications for the product and does not waive or modify any code requirement not specified in this document.

EXPIRATION

This approval will be valid through December 31, 2016, unless manufacturing modifications are made to the product or a re-examination is deemed necessary by the department. The product approval is applicable to projects approved under the current edition of the Wisconsin Commercial Building Code. This approval may be void for project submittals made under future editions of the code.

Reviewed by: JBS

Approval Date: June, 6 2011

By: James B. Smith, P.E.
Program Manager
Bureau of Program Development